REMARKS

The Examiner is thanked for the Final Official Action dated April 16, 2009. This amendment and request for reconsideration is intended to be fully responsive thereto.

Claims 1-15 and 18-20 have been amended to correct minor informalities. No new matter has been added.

Claims 1 and 10 were rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention. Specifically, the Examiner alleges that it is not clear what applicant means by "wherein said metallic insert is disposed separate and apart from said at least one fan blade". The Examiner requests the applicant to specify the spatial direction (radial or axial) in which the metallic insert is disposed separate and apart from the fan blade "to clearly identify the location of the metallic insert". Applicant respectfully disagrees.

As noted in MPEP 2173, "The primary purpose of this requirement of definiteness of claim language is to ensure that the scope of the claims is clear so the public is informed of the boundaries of what constitutes infringement of the patent. A secondary purpose is to provide a clear measure of what applicants regard as the invention so that it can be determined whether the claimed invention meets all the criteria for patentability and whether the specification meets the criteria of 35 U.S.C. 112, first paragraph with respect to the claimed invention."

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Claims 1 and 10 recite that the a metallic insert fixed on the rotor (thus clearly identifying the location of the metallic insert), that the radial web and the fan blade are molded on the metallic insert (thus clearly identifying the location of the radial web and the fan blade), and that the metallic insert is disposed separate and apart from the fan blade. Applicant believes that the person of ordinary skill in the art would clearly realize what the recitation "separate and apart" means. Specifically, the word "separate" is defined by the American Heritage® Dictionary of the English Language, Fourth Edition (Copyright © 2006 by Houghton Mifflin Company. Published by Houghton Mifflin Company. All rights reserved.), as "Set or kept apart; disunited", while the word "apart" is defined as "a. At a distance in place, position, or time; b. Away from another or others". Thus, the recitation "the metallic insert is disposed separate and apart from the at least one fan blade" means that the metallic insert is disposed at a distance from the fan blade.

Therefore, the location of the metallic insert is clearly identified in claims 1 and 10, and the scope of the claims 1 and 10 is clear to a hypothetical person possessing the ordinary level of skill in the pertinent art. Accordingly, claims 1 and 10 are believed to be in conformance with 35 U.S.C. 112, second paragraph.

Claims 1-6, 10-12, 14-16, and 18-20 were rejected under 35 U.S.C. § 103(a) as being unpatentable over Vasilescu et al. (WO 03/029628 (USP 7,168,923 relied upon as English equivalent)) in view of Abadia et al. (WO 01/69762 (US 7,224,093 relied upon as English equivalent)). Claims 7 and 9 were rejected under 35 U.S.C. § 103(a) as being unpatentable over Vasilescu and Abadia in view of Lopatinsky (USP 6,194,798). Claim 13 was rejected as

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being unpatentable over Vasilescu and Abadia and further in view of Gold (USP 4,588,911).

Applicant respectfully disagrees.

Regarding claim 1: the Examiner alleges that Vasilescu teaches all the elements of the present invention as recited in claim 1, except a magnetic target fixed directly onto one of the metallic insert, the radial web and the fan blade to rotate therewith, whereby the magnetic target, in association with at least one sensor, ensures magnetic following of the rotation of the rotor.

Contrary to the Examiner's allegations, Vasilescu fails to disclose a <u>plastic radial web</u> and at least one <u>plastic fan blade</u> both molded on the <u>metallic insert</u>. Vasilescu discloses that the central plate portion 65 of the fan (interpreted by the Examiner as metallic insert) and at least part of the <u>blades</u> 69 are of <u>metal</u> (see col. 8, lines 5-6). Clearly, Vasilescu does not disclose <u>plastic radial web</u> molded on the <u>metallic insert</u>. Moreover, claim 1 recites that the fan blade is of plastic material molded on the metallic insert (i.e. unambiguously refers to the whole blade), while at least part of the <u>blades</u> 69 of Vasilescu is made of <u>metal</u>.

The Examiner further alleges that "Abadia teaches" a magnetic target (Fig 4, 50) which is fixed directly onto one of said metallic insert, said radial web and said fan blade to rotate therewith (Fig 12, 50, 60 and 44,45)". Thus, it appears that the examiner interprets the target holder 60 of Abadia as the metallic insert supporting the magnetic target 50. As clearly disclosed by Abadia and shown in Fig. 12, referred to by the Examiner, "the target holder is of a single piece with the fan, forming an axially-oriented sleeve 60 at the inner periphery of the fan integral, for example by spot welding, with the rotor 4." (See col. 14, lines 35-38 of

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Abadia). In other words, Abadia, like Vasilescu, fails to disclose the <u>plastic radial web</u> and at least one plastic fan blade both molded on the <u>metallic insert</u>.

Thus, even if the combination of and modification of Vasilescu and Abadia suggested by the Examiner could be made, the resulting fan still would lack a <u>plastic radial web</u> and at least one plastic fan blade both molded on the <u>metallic insert</u>, as recited in claim 1.

The Examiner further alleges that it would have been obvious to one of ordinary skill in the art to arrange the magnetic target so that it would be disposed separate and apart from at least one fan blade. However, claim 1 does not recite the magnetic <u>target</u> so that it would be disposed separate and apart from at least one fan blade.

Accordingly, the rejection of claims 1-6, 14, 15 and 18-20 under 35 U.S.C. 103(a) over Vasilescu and Abadia is improper.

Regarding claim 10: similarly to the above arguments regarding the patentability of claim 1 and contrary to the Examiner's allegations, Vasilescu fails to disclose a <u>plastic radial</u> web and at least one <u>plastic fan blade</u> both molded on the <u>metallic insert</u>. Vasilescu discloses that the central plate portion 65 of the fan (interpreted by the Examiner as metallic insert) and at least part of the <u>blades</u> 69 are of <u>metal</u> (see col. 8, lines 5-6). Clearly, Vasilescu does not disclose <u>plastic radial web</u> molded on the <u>metallic insert</u>. Moreover, claim 1 recites that the fan blade is of plastic material molded on the metallic insert (i.e. unambiguously refers to the whole blade), while at least part of the <u>blades</u> 69 of Vasilescu is made of <u>metal</u>.

The Examiner further alleges that "Abadia teaches "a magnetic target (Fig 12, 50)" and "a crown element of plastic material constituting a shroud ring (Fig 3, by numeral 60 and Fig 4 and element 143), with at least some of the blades of the fan extending from the web to

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the crown element (Fig 4), said crown element is formed to direct an air stream radially toward the center of the radial web (Fig 4 shows that the air flow would be directed towards the center)."

Thus, it appears that the examiner interprets the target holder 60 of Abadia as the crown element of plastic material constituting a shroud ring. However, the target holder 60 of Abadia is also interpreted by the Examiner as the metallic insert supporting the magnetic target 50 in the examiner's arguments regarding the patentability of claim 1. Clearly, the target holder 60 of Abadia cannot be interpreted as both the metallic insert supporting the magnetic target 50 and the plastic shroud ring. Moreover, if the target holder 60 is interpreted as the shroud ring, it is not clear which element of Abadia is interpreted by the Examiner as the metallic insert supporting the magnetic target 50. Furthermore, the element 143, also interpreted by the Examiner as the plastic shroud ring, is clearly defined by Abadia as axiallyoriented teeth provided on an outer periphery of a transverse flange of two magnet wheels of the rotor 4 (see col. 5, lines 41-48). Clearly, those skilled in the art would not possibly interpret the teeth 143 of the rotor wheels as the shroud ring. Also, the blades 45 of the fan of Abadia do not extend from the plastic web (not disclosed by Abadia) to either the target holder 60 or the teeth 143 (both interpreted by the Examiner as the plastic shroud ring), as recited in claim 10.

Moreover, contrary to the Examiner's allegations, Abadia fails to disclose the crown element formed to direct an air stream radially toward the center of the radial web. First, it is well known in the art that there are two configurations of the air fans (or blowers): axial fans (directing air flow axially parallel to center of rotation of the fan) and centrifugal fans (directing air flow radially outwardly from the center of rotation). Those skilled in the art

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would readily realize that the fan 44 (being a fan for a starter/alternator of a motor vehicle) is an <u>axially-acting</u> fan. Second, the blades 45 of the fan of Abadia are not formed with the plastic shroud ring which is provided to direct an air stream radially toward the center of the radial web, as recited in claim 11.

Thus, even if the combination of and modification of Vasilescu and Abadia suggested by the Examiner could be made, the resulting fan still would lack a <u>plastic radial web</u> and at least one <u>plastic fan blade</u> both molded on the <u>metallic insert</u>, and the <u>plastic crown element</u> constituting a shroud ring, with at least some of the blades of the fan <u>extending from the web to the crown element</u>, whereby the <u>crown element is formed to direct an air stream</u> radially toward the center of the radial web, as recited in claim 10.

Accordingly, the rejection of claims 10-12 under 35 U.S.C. 103(a) over Vasilescu and Abadia is improper.

Further regarding claims 7 and 9: In addition to the arguments regarding the patentability of claim 1 and contrary to the Examiner's allegations, Lopatinsky fails to disclose the magnetic target comprises a magnetic material combined with the plastic material of the web and/or fan blades, or magnetic plastic material. In fact, Lopatinsky discloses a DC driven fan with <u>blades</u> made of magnetized plastic, not the magnetic <u>target</u> as recited in claims 7 and 9. Accordingly, the rejection of claims 7 and 9 under 35 U.S.C. 103(a) over Vasilescu and Abadia in view of Lopatinsky is improper.

<u>Further regarding claim 13</u>: In addition to the arguments regarding the patentability of claim 1 and contrary to the Examiner's allegations, Gold fails to disclose the powder pot for

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the connecting wires of the rotor. Instead, Gold discloses in col. 2, lines 40-53 (referred to by

the Examiner) that the entire outer periphery or surface of the core member 22, including the

slot surfaces but excluding the end faces, has a thin paint coating of a two-part epoxy wet

paint that can be sprayed on the core. The thin solid coat of epoxy paint is provided over the

outer periphery of the rotor core for insulation, not for the connecting wires of the rotor, as

recited in claim 13. Accordingly, the rejection of claim 13 under 35 U.S.C. 103(a) over

Vasilescu and Abadia and further in view of Gold is improper.

It is respectfully submitted that claims 1-15 and 18-20 define the invention over the

prior art of record and are in condition for allowance, and notice to that effect is earnestly

solicited. Should the Examiner believe further discussion regarding the above claim

language would expedite prosecution they are invited to contact the undersigned at the

number listed below.

Respectfully submitted,

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